



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE

United States Patent and Trademark Office

Address: COMMISSIONER FOR PATENTS

P.O. Box 1450

Alexandria, Virginia 22313-1450

www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/806,211	03/23/2004	Hiroki Hasegawa	826.1938	1684
21171	7590	09/17/2010		
STAAS & HALSEY LLP SUITE 700 1201 NEW YORK AVENUE, N.W. WASHINGTON, DC 20005			EXAMINER	
			CLOUD, JOIYA M	
			ART UNIT	PAPER NUMBER
			2444	
			MAIL DATE	DELIVERY MODE
			09/17/2010	PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

# Office Action Summary

**Application No.**

10/806,211

**Applicant(s)**

HASEGAWA ET AL.

**Examiner**

Joiya M. Cloud

**Art Unit**

2444

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 03/01/2010.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 3-10, 12, 14 and 15 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 3-10, 12, 14 and 15 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO/SB-08)  
Paper No(s)/Mail Date \_\_\_\_\_
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date \_\_\_\_\_
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: \_\_\_\_\_

***DETAILED ACTION***

This action is responsive to the communication filed on 03/01/2010. Claims 3-10, 12, 14, AND 15 are PENDING.

***Continued Examination Under 37 CFR 1.114***

A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 10/23/2008 has been entered.

***Response to Arguments***

A) Jackson lacks "any discussion of a "correlation between the past transaction amount and a required resource amount." Moreover Applicant argues,

Jackson does not teach "substituting the transaction occurrence amount of the target module...for the transaction processing amount...fluctuating an allocation of resource amount of the target module."

As to the above argument A), Examiner respectfully disagrees. Examiner submits that paragraph [0223] clearly teaches where correlating (i.e. the evaluation of a requested transaction) between "the identified resources that are going to be required to process the particular request..."having a processing usage amount. In regards to substituting the transaction occurrence

amount of the target module...fluctuating an allocation of resource amount of the target module, Examiner submits that Jackson teaches in paragraph [0270] adaptively or dynamically allocating resource and thus dynamic allocation reads upon fluctuating allocation of resource amount.

B) Jackson does not teach or suggest these features of claim 7.

As to the above point B), Examiner respectfully disagrees. Please see paragraph [0013], where Jackson teaches preferentially allocating resources.

*Claim Rejections - 35 USC § 112*

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claims 3-10, 12, 14, and 15 rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

**As per claim 3-10, 12, 14, and 15, the claims are generally narrative and indefinite, failing to conform with current U.S. practice. They appear to be a literal translation into English from a foreign document and are replete with grammatical and idiomatic errors.**

Claims 3 and 12 recites "the transaction occurrence amount" in lines 14 and 12 respectively. There is insufficient antecedent basis for this limitation in the claim.

Claim 3 recites "a past transaction occurrence amount..." The claim is unclear as to what a "past transaction occurrence amount" is? Furthermore, how does a past transaction occurrence amount differ from the claimed "a past transaction amount"?

Claim 3 recites "a past transaction amount..." The claim is unclear as to what a "past transaction amount" is? Furthermore, how does a past transaction amount differ from "a past transaction processing amount"?

Claim 3 recites "generates an approximate function that expresses a correlation between a required resource amount...", however fails to state the other entity of which the correlation is between. The claim merely states what the correlation is based on, thus the claim is unclear.

Claim 3 recites "fluctuates an allocation of resource amount..." The claim is unclear as to as to whether the allocation fluctuates or the resource amounts are fluctuated?

Claim 3 also recites "generates a predicted transition...corresponding to two or more different cycles selected among a plurality of cycles..." The claim does not appear to be drawn towards *selected* cycles among a plurality of cycles or define a step of selecting in the claim?

Claim 3 recites "generates transitions of the transaction occurrence amount of the target module for each of a plurality of different cycles..." The claim having no explicit definition of the term "transitions" does not clearly indicate how such transitions are generated, as one of ordinary skill in the art would reasonably interpret a transition to indicate passage from one point to another. However, the claim does not mention the transaction occurrence amount as changing in such a way to produce a transition. Examiner advises Applicant to amend the instant claim to further detail how such generation occurs and what constitutes a transition.

Claim 12 recites similar limitations as stated above with respect to independent claim 3 and thus are rejected for similar rationale.

Claim 7 recites, "allocating resources to the target module during a period *since* ..." The term "since" does not require but makes optional the claimed functionality of reaching a predetermined bottleneck detection threshold.

***Claim Rejections - 35 USC § 102***

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

**Claims 1-10, 12, 14 and 16** are rejected under 35 U.S.C. 102(b) as being clearly anticipated by **Jackson et al. (US Pub. No. 2002/0152305 A1)**

**As per claim 3**, Jackson teaches a resource adjustment apparatus for adjusting an amount of computer resources used in a system having a plurality of modules each comprising at least one application program, the resource adjustment apparatus comprising:

a storage device that stores data representing a past transaction amount and an amount of resources of a module used in the past over a period of time, for the plurality of modules, the past transaction amount includes a past transaction occurrence amount and a past transaction processing amount; a generation device that performs an operation including: obtains past transaction occurrence amount of a target module from the storage device,

generates transitions of the transaction occurrence amount of the target module for each of a plurality of different cycles based on obtained past transaction occurrence amount of the target module,

Generates a predicted transition of transaction occurrence amount of the target module in a specific cycle unit by combining the generated transitions corresponding to two or more different cycles selected amount a plurality of cycles,

Generates an approximate function that expresses a correlation between a transaction processing amount and a required resource amount, based on correspondence between the past transaction processing amount and the amount of resource used in the past corresponding to the target module stored in the storage device, and

Generates a predicted transition of the required resource amount by substituting the transaction occurrence amount of the target module corresponding to the predicted transition of transaction occurrence amount for the transaction processing amount of the approximate function; and an allocation device that fluctuates an allocation of resource amount of the target module in accordance with the predicted transition of the required resource amount.

**As per claim 4**, claim 4 recites substantially similar limitations as claim 3, but in computer-readable medium form rather than apparatus form. Therefore, the rejection for claim 3 applies equally as well to claim 4.

**As per claim 5**, Jackson teaches a storage medium wherein the program causes the computer to perform: displaying the predicted transition of the required resource amount on a screen; and when the operator changes the displayed transition of the required resource amount,

using the changed transition of the required resource amount as the predicted transition of the required resource amount.

**As per claim 6**, Jackson teaches a storage medium wherein the program causes the computer to perform: obtaining a most-recent transaction occurrence amount of the target module from the storage device; using a predicted transition of the required resource amount generated by of the most-recent transaction occurrence amount as a predicted transition of an immediately-after required resource amount; and fluctuating allocation of immediately-after resource amount of the target module.

**As per claim 7**, Jackson teaches a storage medium wherein the program causes the computer to perform: preferentially allocating resources to the target module during a period since a required resource amount of the target module reaches a predetermined bottleneck detection threshold until a required resource amount of the target module reaches a bottleneck elimination threshold (**paragraphs [0223],[0461], [0467], and [0600]**).

**As per claim 8**, Jackson teaches storage medium wherein the program causes the computer to perform: preferentially allocating resources to the target module during a period since a transaction occurrence amount of the target module reaches a predetermined bottleneck detection threshold until a transaction occurrence amount of the target module reaches a bottleneck elimination threshold (**paragraph [0461], [0466], [0467] [0600]**).

**As per claim 9**, Jackson teaches a storage medium wherein the program causes the computer to perform: instructing the target module to generate a child processing when a



required resource amount of the target module reaches a predetermined amount (**paragraphs [0009], [0030], [0031]**).

**As per claim 10**, Jackson teaches a storage medium wherein the program causes the computer to perform: displaying a screen for capacity planning support including a predicted transition of the required resource amount that is predicted for a long time (**paragraph [0457, [0458]**).

**As per claim 12**, claim 12 is substantially the same as claim 4 but in method form rather than computer-readable storage medium form. Therefore, the rejection for claim 4 applies equally as well to the rejection for claim 12.

As per claim 14, claim 14 recites substantially the same limitations as claim 3, therefore the rejection for claim 3 applies equally as well to claim 14.

**As per claim 15**, Jackson teaches wherein the generation device generates patterns of a transition of the transaction occurrence amount of a plurality of different cycles based on obtained past transaction occurrence amount of the target module, when generating the transitions of the transaction occurrence amount of the target module, and displays the generated patterns onto a screen (**paragraph [0457]**).

***CONCLUSION***

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Joiya Cloud whose telephone number is 571-270-1146. The examiner can normally be reached Monday to Friday from on 7:30am-5:00pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, William Vaughn can be reached on 571-272-3922. The fax phone number for the organization where this application or proceeding is assigned is 571-273-3922.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

***JMC***

**September 10, 2010**

/William C. Vaughn, Jr./

Supervisory Patent Examiner, Art Unit 2444

